

Amendments to the Claims

Please cancel claims 1-18 without prejudice. Please add new claims 19-38 as shown below in the list of claims.

List of Claims

- 1-18. Cancelled.
19. (New) A high-transparency plastic material comprising:
a) a plastic matrix; and
b) a nanoscale laser-sensitive metal oxide within said plastic matrix;
wherein said plastic material is laser-markable or laser-weldable.
20. (New) The plastic material of claim 19, wherein said metal oxide has a particle size of 1 to 500 nm.
21. (New) The plastic material of claim 20, wherein said particle size is 5 to 100 nm.
22. (New) The plastic material of claim 19, wherein said metal oxide comprises 0.0001 to 0.1 weight-percent of said plastic material.
23. (New) The plastic material of claim 22, wherein said metal oxide comprises 0.001 to 0.01 weight-percent of said plastic material.
24. (New) The plastic material of claim 19, wherein said metal oxide is selected from the group consisting of: doped indium oxide; doped tin oxide; and doped antimony oxide.
25. (New) The plastic material of claim 24, wherein said metal oxide is indium-tin oxide or antimony-tin oxide.
26. (New) The plastic material of claim 25, wherein said metal oxide is blue indium-tin oxide.
27. (New) The plastic material of claim 19, wherein said plastic matrix comprises one or more materials selected from the group consisting of: poly(meth)acrylate; polyamide; polyurethane; polyolefins; styrene polymers and styrene copolymers; polycarbonate; silicones; polyimides; polysulfone; polyethersulfone; polyketones; polyetherketones;

polyphenylsulfide; polyester; polyethylenoxide; polyurethane; polyolefins; and fluorine-containing polymers.

28. (New) The plastic material of claim 19, wherein said plastic matrix comprises polymethyl methacrylate.
29. (New) The plastic material of claim 19, wherein said plastic matrix comprises bisphenol-A-polycarbonate.
30. (New) The plastic material of claim 19, wherein said plastic matrix comprises polyamide.
31. (New) The plastic material of claim 19, said wherein said metal oxide:
 - a) has a particle size of 1 to 500 nm; and
 - b) comprises 0.0001 to 0.1 weight-percent of said plastic material.
32. (New) The plastic material of claim 31, wherein said metal oxide is selected from the group consisting of: doped indium oxide; doped tin oxide; and doped antimony oxide.
33. (New) The plastic material of claim 32, wherein said plastic matrix comprises one or more materials selected from the group consisting of: poly(meth)acrylate; polyamide; polyurethane; polyolefins; styrene polymers and styrene copolymers; polycarbonate; silicones; polyimides; polysulfone; polyethersulfone; polyketones; polyetherketones; polyphenylsulfide; polyester; polyethylenoxide; polyurethane; polyolefins; and fluorine-containing polymers.
34. (New) The plastic material of claim 19, wherein said plastic material is in the form of a molded body, semifinished product, molding compounds, or lacquers.
35. (New) A method for producing a high-transparency laser-markable and/or laser-weldable plastic material, comprising mixing nanoscale laser-sensitive metal oxides with a plastic matrix under conditions of high shear.
36. (New) The method of claim 35, wherein:
 - a) said metal oxide:
 - i) has a particle size of 1 to 500 nm;
 - ii) comprises 0.0001 to 0.1 weight-percent of said plastic material;
 - iii) is selected from the group consisting of: doped indium oxide; doped tin oxide; and doped antimony oxide; and

- b) said plastic matrix comprises one or more materials selected from the group consisting of: poly(meth)acrylate; polyamide; polyurethane; polyolefins; styrene polymers and styrene copolymers; polycarbonate; silicones; polyimides; polysulfone; polyethersulfone; polyketones; polyetherketones; polyphenylen-sulfide; polyester; polyethylenoxide; polyurethane; polyolefins; and fluorine-containing polymers.
37. (New) The method of claim 35, wherein said nanoscale laser-sensitive metal oxides are in the form of a concentrated pre-mixture with the plastic material.
38. (New) A method for welding plastic molded bodies or plastic semifinished products, wherein at least one of the parts to be joined comprises a plastic material according to claim 1 at least in the surface area, said method comprising irradiating a join face of said plastic molded bodies or plastic semifinished products with laser light to which the metal oxide contained in said plastic material is sensitive.